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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/660,222	09/10/2003	Gelu Voicu	CAT-12502-1	7704
22888	7590	05/16/2007	EXAMINER	
BEVER HOFFMAN & HARMS, LLP			LAUTURE, JOSEPH J	
TRI-VALLEY OFFICE				
1432 CONCANNON BLVD., BLDG. G			ART UNIT	PAPER NUMBER
LIVERMORE, CA 94550				2819
			MAIL DATE	DELIVERY MODE
			05/16/2007	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

<b>Office Action Summary</b>	<b>Application No.</b>	<b>Applicant(s)</b>	
	10/660,222	VOICU ET AL.	
	<b>Examiner</b>	<b>Art Unit</b>	
	Joseph Lauture	2819	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

#### **Status**

- 1) Responsive to communication(s) filed on 19 March 2007.
- 2a) This action is **FINAL**.                            2b) This action is non-final.
- 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

#### **Disposition of Claims**

- 4) Claim(s) 37-122 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) Claim(s) 37-77 and 86-122 is/are allowed.
- 6) Claim(s) 78-82 is/are rejected.
- 7) Claim(s) 83-85 is/are objected to.
- 8) Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

#### **Application Papers**

- 9) The specification is objected to by the Examiner.
- 10) The drawing(s) filed on \_\_\_\_\_ is/are: a) accepted or b) objected to by the Examiner.  
 Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
 Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

#### **Priority under 35 U.S.C. § 119**

- 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) All    b) Some \* c) None of:
  1. Certified copies of the priority documents have been received.
  2. Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

#### **Attachment(s)**

- 1) Notice of References Cited (PTO-892)
- 2) Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) Information Disclosure Statement(s) (PTO/SB/08)  
 Paper No(s)/Mail Date \_\_\_\_\_.
- 4) Interview Summary (PTO-413)  
 Paper No(s)/Mail Date. \_\_\_\_\_.
- 5) Notice of Informal Patent Application
- 6) Other: \_\_\_\_\_.

## DETAILED ACTION

### ***Response to Arguments***

Applicant's arguments filed on 03/19/2007 have been entered.

Applicant's arguments have been considered but they are not persuasive.

The applicant argues that the Mouret reference fails to teach a permanently-on switch because the transistor/switch Q5 switches between a blocked and conductive state.

The examiner disagrees because although the Mouret reference teaches that the transistor/switch can be blocked, it also teaches that the transistor/switch Q5 can be set to permanent conductive mode (See column 4, lines 50-55).

### ***Claim Rejections - 35 USC § 103***

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 78-82 are rejected under 35 U.S.C. 103(a) as being unpatentable over Watanabe et al (US 5,414,389) in view of Mouret (US 5,034,631).

Regarding this claim, Watanabe et al teach in figure (6) a potentiometer circuit (21) comprising: a first reference terminal, and a second reference terminal; and a plurality of impedance devices (RP1...RPm) coupled between the first and second reference terminals; and, a plurality of structures comprising transistor switches (QP1...QPM) in parallel with a corresponding one of the impedance devices.

Watanabe et al do not specifically teach a permanently-on switch in parallel with an impedance device. However, the teaching of a permanently on switch is not new, as evidenced by Mouret (US 5,034,631). Mouret teaches an output circuit having a plurality of transistor switches wherein a transistor/switch Q5 is set to be permanently on (See column 4, lines 50-55). It would have been obvious to one of ordinary skill in the art at the time the invention was made to combine the teachings of Watanabe et al and of Mouret to improve system performance and reliability because that would reduce the Miller effect of the switching (See column 4, lines 44-47).

Regarding claims 79-82, Watanabe et al teach in figure (6) a potentiometer circuit (21) comprising: a plurality of structures including respective switches QP1...QPm wherein: each structure is bypassable by a switching device (when the transistor is conducting) (See column 5, lines 43-51); wherein there are a plurality of structures including a plurality of switching devices, each switching device operable to bypass another structure/switch or another impedance device (See column 5, lines 43-51).

**THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any

extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

***Allowable Subject Matter***

Claims 83-85 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Claims 37-77 and 83-122 are allowable.

#### CONTACT INFORMATION

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Joseph Lauture, whose telephone number is (571) 272-1805. The examiner can normally be reached Monday to Friday between 9:30 am and 6:00 PM

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Rexford Barnie can be reached at (571) 272-7492. The fax number for the organization to which this application is assigned is (571) 273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll free).

*Rexford Barnie*  
REXFORD BARNIE  
SUPERVISORY PATENT EXAMINER

Joseph Lauture  
Art Unit: 2819  
Date: 05/11/2007

05/10/07